

1 31. A computer readable medium for executing an operation upon
2 a linked data structure having at least one element, the
3 computer readable medium comprising:

4 (a) a code segment for dividing the operation into first
5 and second distinct sets of operation tasks;

6 (b) a code segment for performing the first set of
7 operation tasks in a first phase; and

8 (c) a code segment for performing the second set of
9 operation tasks in a second phase.

1 32. A system for executing an operation upon a linked data
2 structure having at least one element, the system comprising:
3 (a) a means for performing a first set of operation tasks
4 in a first phase, the first set of operation tasks
5 operable to effect a first set of element state
6 transitions;
7 (b) a means for developing a second set of operation
8 tasks, the second set of operation tasks operable to
9 effect a second set of element state transitions, the
10 second set of element state transitions being distinct
11 from the first set of element state transitions; and
12 (c) a means for performing the second set of operation
13 tasks in a second phase.

1 33. A system for executing an operation upon a linked data
2 structure having at least one element, the system comprising:
3 (a) a means for dividing the operation into first and
4 second distinct sets of operation tasks;
5 (b) a means for performing the first set of operation
6 tasks in a first phase; and
7 (c) a means for performing the second set of operation
8 tasks in a second phase.

1 34. A method for executing an operation upon a linked data
2 structure having at least one element, the method comprising the
3 steps of:

4 (a) creating a first set of operation tasks, the
5 first set of operation tasks being characterized
6 by navigation of the linked data structure using
7 at least an existing link;

8 (b) creating a second set of operation tasks, the
9 second set of operation tasks being different
10 from the first set of operation tasks and being
11 characterized by location of elements within the
12 linked data structure using at least one pointer
13 created by the first set of operation tasks; and

14 (c) performing at least one operation task of the
15 first set of operation tasks in a first phase and
16 at least one operation task of the second set of
17 operation tasks in a second phase.

1 35. The method of claim 34 wherein the first set of operation
2 tasks is operable to maintain consistent navigation of the
3 linked data structure.